

To: Way, Steven[way.steven@epa.gov]
From: Ostrander, David
Sent: Mon 9/14/2015 10:40:45 PM
Subject: RE: R8 Q&As

I was trying to be brief as this is for the administrator... brief always means leaving out important facts. Thanks. I may have to pare it back down.

From: Way, Steven
Sent: Monday, September 14, 2015 4:35 PM
To: Ostrander, David; Hestmark, Martin; Card, Joan; Ackerman, Joyce; McGrath, Shaun
Subject: RE: R8 Q&As

See Way's edits (hopefully in orange) to 2014 conditions

Steven Way

Federal On-Scene Coordinator

Emergency Response Unit

US EPA - Region 8

1595 Wynkoop Street

Denver, CO 80202

Office: 303-312-6723

From: Ostrander, David
Sent: Monday, September 14, 2015 3:09 PM
To: Hestmark, Martin; Card, Joan; Ackerman, Joyce; McGrath, Shaun

Cc: Way, Steven
Subject: RE: R8 Q&As

Revised to include flow capacity

Q: EPA's contractor caused a spill of diesel fuel on a property owners land. What have you done to report this incident and what did you do about?

A: EPA had placed a generator on the property on the property of Li'l Fishes to assist the owner with maintaining the health of his fish ponds. The generator powered an aerator and/or water hose for the ponds. On September 10, 2015, the property owner reported that some diesel spill had spilled on the ground from the generator. He reportedly told another party that the volume was 1-2 gallons. An EPA On-Scene Coordinator responded the same day accompanied by EPA contractors. The OSC did not see or smell any evidence of a fuel spill. The OSC requested the property owner to delineate the area of the spill, and he pointed to an area approximately 4 feet wide by 4 feet long. Despite seeing no evidence of a fuel spill, the OSC directed the contractors to conduct a shallow scrape of soil approximately one inch deep, drum up the soils, and take them off-site for proper disposal. The OSC directed the contractors to take a confirmation sample after the removal of soils and those laboratory results are pending. The area in question was approximately 25 feet from one of the fish ponds. The OSC contacted the Colorado Department of Public Health and Environment spill line and described the circumstances, and CDPHE stated that in these circumstances, only spills over 25 gallons needed to be reported. The alleged spill was not reported to the NRC as there was no impact or threat to surface water. Sample results will be provided to the property owner when they are available.

Q: September 9, 2015 Article in Colorado Watchdog.org entitled "Colorado mine owner: EPA lied in congressional hearing", Todd Hennis, Gold King's owner is quoted as saying:

"It shows there was no flow of water coming out," Hennis said. "They are calling it an act of God when it was an act of government. The photos clearly show the EPA backfilled the portal to block water from coming out and they blocked the discharge pipes at the same time." "It's absolute baloney of the worst sort," Hennis said immediately after the hearing. "They blocked off the flow of water out of the drain pipes and they created the huge wall of water in the Gold King by their actions last year."

A: On September 11, 2014, work began to remove the material and pipe that was placed in 2009

by DRMS as a safety and reclamation closure in front of the existing debris/collapsed adit blockage ("Project Summary Phase II – 2009, Colorado DRMS). Prior to disturbing any part of the adit area, flow measurements and photographs were obtained by the EPA's contractor. The associated drainage pipe from the 2009 DRMS reclamation work drained into the concrete channel installed in 2009 that connected to the open pipe installed in 2008 (phase I DRMS work). The adit portal collapse and actual blockage in the **Gold King adit** was NOT disturbed in 2014 during the EPA assessment project. **The work stopped** shortly after beginning on the 11th when it was determined that the elevation of the adit floor was estimated to be six (6) feet below the waste-dump surface elevation, assuming at most a 10 foot adit height. The presence of water below two (2) 24-inch pipes indicated the current flow of water was coming out at least four (4) feet below the roof of the adit, indicating approximately six (6) feet of impounded water above the estimated adit floor elevation. On September 12, 2014, the drainage from the mine was routed into two (2) 12 inch diameter drain pipes that were placed at the base of the rock debris / blockage to capture the on- going mine water drainage and direct flow into the existing concrete flume channel installed by DRMS. A trench was excavated where the water was draining from the blockage and clean rock was placed to promote free draining conditions into the pipe, and geotextile fabric was placed to prevent soil fines from plugging the rock/pipe drain. The pipe were connected to the concrete drainage channel. **The exposed adit area was backfilled** establish an appropriate slope to reduce erosion from the slope above, and a berm was placed at the toe of the fill behind the pipe to prevent rock debris or soil from blocking the concrete channel and pipe outlets. **The addition of clean rock only improved drainage into the pipe and was well back from the adit blockage and did not cause any impoundment of water and the two drain pipes were flowing all of the discharge into the concrete channel at the end of the work.** These two pipes have a capacity of 4000 to 8000 gpm depending on the pipe slope / flow velocity and head, more than adequate to drain the existing discharge and not create any backup in the mine adit. The drain pipes were still flowing when workers returned to the site in 2015.

(NOTE: The DRMS pipe never penetrated the actual adit blockage with either the steel "well point" or the large diameter water pipe. The flow only came from in and around the large diameter water pipe. The START member who measure flow in August also measured flow before the September 2014 work and noted the lower flow that was present in September. Historically, the flow has been low in the fall, example Oct 2012 at 55 gpm.)

NOTE: START calculated today that a single 12 inch diameter pipe (11.25 inch ID) would carry approximately 2000 gpm at less than 1 % grade.